

The bumble bee *Bombus terrestris* (L.) (Hym.: Apidae) in mid-winter

Whilst visiting a friend in Rochester, East Kent on 22 December 2001, I noticed a large bee flying around a *Clematis* plant growing on a south-facing wall of a neighbour's house. Taking a pair of 7 × 42 binoculars, I went outside to obtain a better view. The bee, a queen *Bombus terrestris*, was visiting the downward-hanging flowers of *Clematis cirrhosa*, and did this for several minutes until it was lost to sight behind a wall.

Although the sun was shining at the time, this all took place during a spell of rather cold weather. The temperature at the time was a mere 3°C and there was a frost on both that night and the previous one. One wonders if this was a queen from a late brood trying to find sustenance before going into hibernation, or one trying to make an early start to the season.— D. GRANT, 20 Warwick Crescent, Rochester, Kent MW1 3LF.

INVITED COMMENT ...

Bumble bee activity in December was formerly a very rare event and probably the result of a queen having been disturbed from its over-wintering site. However, during the last decade such sightings have become more frequent and widespread and have involved both queens and workers. These records are mainly restricted to those counties along the Channel coast and in southern Ireland. The bees have been *Bombus lucorum* and *B. terrestris*, though records of workers are usually recorded as *B. lucorum/terrestris* as individuals of this caste are very difficult to identify to species with confidence. Queens are generally quite straightforward. Examples of my own recent sightings are as follows. On 13 February 2000 I observed several *B. lucorum/terrestris* workers visiting *Mahonia japonica* flowers in my garden. Their presence on this very early date (especially for workers) indicate nest establishment by their mother in January and quite possibly earlier. I saw a queen *B. lucorum* visiting comfrey flowers in the same garden on 24 February 2001. This individual carried full pollen loads, indicating that it was provisioning its nest. Last year I noted a queen *Bombus ?terrestris* (glimpse only) in a private garden in Broadstone, Dorset, on 24 November. Finally, my wife saw what she thought was a worker *B. lucorum/terrestris* in our garden on 14 December. Chris Haes, in west Cornwall (Angarrack, near Hayle), has also seen bumble bee activity in the winter in his garden.

Whether all these records are of continued nesting throughout the late preceding summer and winter (with colonies finally succumbing late in the winter or spring) or of second or third generations is unknown. I have, for instance, seen queen *B. terrestris* with full pollen loads in the late summer (August) and these might produce their progeny weeks later. Colonies of social wasps, though only of *Vespula germanica* and *V. vulgaris*, occasionally continue well into the winter, with worker activity taking place in an ambient temperature of 1° Celsius or less. Several years ago, I had a nest of *V. germanica* in my house wall, which continued, albeit in greatly reduced numbers, throughout the winter with worker activity noted on both Christmas Day and New Year's Day! The colony finally succumbed by late winter/early spring. Perhaps similar behaviour occurs with *B. lucorum* and *B. terrestris*?— GEORGE ELSE, Department of Entomology, Natural History Museum, London SW7 5BD.